

ABSTRACT OF THE DISCLOSURE

A method of cryogenic treatment of tungsten carbide containing cobalt. A first step involves pre-treating tungsten carbide with microwave sintering, thereby changing
5 the properties of the tungsten carbide. A second step involves lowering the temperature of the microwave sintered tungsten carbide gradually to cryogenic levels. A third step involves raising the temperature of the microwave sintered tungsten carbide gradually back to ambient temperatures. The
10 described combination of microwave sintering and cryogenic treatment produces significant improvement in impact resistance, erosion and corrosion resistance and wear rate.